

AMENDMENT TO THE CLAIMS

Please amend the claims as follows. This listing will replace all prior versions and listings of claims in the Application. Claims 1-4, 10-17, and 20-26 have been amended. Claims 7 and 28 have been cancelled.

Listing of Claims

1. (Currently amended): A guidewire, comprising:

an elongate member comprising (1) a proximal end, (2) a main body having a first uniform diameter, (3) a distal end comprising an elongate tip having a second uniform diameter, and (4) a single taper portion disposed directly between the main body and distal end and defining a first taper between the first and second uniform diameters, the elongate member forming a solid, unitary portion; and

a coating disposed on the distal end and secured to the elongate tip having the second uniform diameter of the distal end, the coating comprising a solid flexible tip having a length axially extending beyond the elongate tip of the distal end of the elongate member in the distal direction, the solid flexible tip is made from primarily biocompatible material and forms a distal end portion of the guidewire having a flexible and solid structure, the length of the solid flexible tip that extends axially beyond the elongate tip of the distal end being approximately equal to or greater than a longitudinal length of the elongate tip of the distal end, the ratio of (a) the length of the solid flexible tip that extends axially beyond the elongate tip of the distal end to (b) the first uniform diameter of the main body of the elongate member being greater than 3:1, the coating having a proximal portion and a distal portion, the proximal portion commencing within the taper portion of the elongate member and encapsulating the elongate tip having the second uniform diameter, wherein at least a partial exterior of the coating has a second taper that approximates the first taper of the taper portion.

2. (Currently amended): The guidewire of claim 1, further comprising a radiopaque marker disposed in the solid flexible tip, the radiopaque marker providing localized weight to the solid flexible tip to enhance flow direction properties of the solid flexible tip.

3. (Currently amended): The guidewire of claim 2, wherein a portion of the coating is disposed between the distal end of the elongate member and the radiopaque marker, the coating being a blend of polymers selected to achieve the desired flexibility ~~and the portion of the coating being solid.~~
4. (Currently amended): The guidewire of claim 1, wherein the solid flexible tip comprises radiopaque material, the radiopaque material comprising an opacifying agent loaded into the solid flexible tip, a concentration of the opacifying agent being based upon the diameter of the elongate member.
5. (Previously presented): The guidewire of claim 1, wherein the coating comprises radiopaque material, the radiopaque material comprising an opacifying agent loaded into the coating, a concentration of the opacifying agent being based upon the diameter of the coating.
6. (Previously presented): The guidewire of claim 1, wherein the coating comprises an outer diameter approximately equal to or less than the first uniform diameter.
7. (Cancelled)
8. (Original): The guidewire of claim 1, wherein the elongate member comprises one of stainless steel and nitinol.
9. (Previously presented): The guidewire of claim 1, further comprising a lubricious coating disposed directly on at least a portion of the main body.
10. (Currently amended): The guidewire of claim 1, wherein the ratio of the length of the solid flexible tip that extends axially beyond the elongate tip of the distal end of the elongate member to the first uniform diameter is between 10:1 and 500:1.
11. (Currently amended): The guidewire of claim 1, wherein the ratio of the length of the solid flexible tip that extends axially beyond the elongate tip of the distal end of the elongate member to the first uniform diameter is between 10:1 and 300:1.

12. (Currently amended): The guidewire of claim 1, wherein the ratio of the length of the solid flexible tip that extends axially beyond the elongate tip of the distal end of the elongate member to the first uniform diameter is between 12:1 and 250:1.

13. (Currently amended): The guidewire of claim 1, wherein the length of the solid flexible tip that extends axially beyond the elongate tip of the distal end of the elongate member is greater than 3 mm.

14. (Currently amended): A guidewire, comprising:

an elongate member comprising (1) a proximal end, (2) a main body having a first diameter, (3) a distal ~~end~~ tip portion comprising an elongate tip having a first length and a uniform second diameter, and (4) a single taper portion, the single taper portion being the only tapered portion of the elongate member and disposed directly between the main body and distal ~~end~~ tip portion and defining a first taper between the first and second diameters, the elongate member forming a solid, unitary portion; and

a coating disposed on at least the elongate tip of the distal end tip portion of the elongate member and comprising a flexible and solid tip of primarily biocompatible material that is located at a distal end of the guidewire, the flexible and solid tip having a second length axially extending beyond the first length of the elongate tip of the distal tip portion of the elongate member, the second length of the flexible and solid tip being approximately equal to or greater than the first length of the elongate tip of the distal tip portion of the elongate member, wherein at least a partial exterior of the coating has a second taper that approximates the first taper of the taper portion.

15. (Currently amended): The guidewire of claim 14, further comprising a radiopaque marker disposed within the flexible and solid tip.

16. (Currently amended): The guidewire of claim 15, wherein a continuous portion of the coating material is disposed between the distal ~~end~~ tip portion of the elongate member and the radiopaque marker.

17. (Currently amended): The guidewire of claim 14, wherein the flexible and solid tip comprises radiopaque material, the radiopaque material comprising an opacifying agent loaded into the coating, a concentration of the opacifying agent being based upon the uniform second diameter of the elongate member.

18. (Previously presented): The guidewire of claim 14, wherein the coating comprises radiopaque material, the radiopaque material comprising an opacifying agent loaded into the coating, a concentration of the opacifying agent being based upon the diameter of the coating.

19. (Previously presented): The guidewire of claim 14, wherein the coating is disposed on at least a portion of the main body.

20. (Currently amended): The guidewire of claim 14, wherein the flexible and solid tip comprises a curvilinear portion that is J-shaped and has a rounded tip, the curvilinear portion commencing distally beyond the elongate tip of the distal tip portion of the elongate member.

21. (Currently amended): A guidewire, comprising:

an elongate member comprising a proximal end, a main body having a first diameter, a distal ~~end~~ tip portion comprising an elongate tip having a uniform second diameter, and a single taper portion disposed directly between the main body and distal ~~end~~ tip portion and defining a taper between the first and second diameters;

a polymer coating ~~disposed on~~ secured to the distal ~~end~~ tip portion and commencing within a portion of the single taper portion, at least a portion of the exterior of the polymer coating has a second taper that approximates the taper of the single taper portion, the polymer coating comprising a flexible tip of solid composition having a length axially extending beyond the elongate tip of the distal ~~end~~ tip portion, the length of the flexible tip axially extending beyond the elongate tip of the distal tip portion being greater than a longitudinal length of the elongate tip of the distal tip portion;

a radiopaque marker disposed in the flexible tip to provide localized weight within the flexible tip and spaced from the distal ~~end~~ tip portion of the elongate member; and

a lubricious coating disposed on at least a portion of the main body.

22. (Currently amended): The guidewire of claim 21, wherein the ratio of the length of the flexible tip that extends beyond the elongate tip of the distal tip portion to the first diameter of the main body is between 10:1 and 500:1.

23. (Currently amended): The guidewire of claim 21, wherein the ratio of the length of the flexible tip that extends beyond the elongate tip of the distal tip portion to the first diameter of the main body is between 10:1 and 300:1.

24. (Currently amended): The guidewire of claim 21, wherein the ratio of the length of the flexible tip that extends beyond the elongate tip of the distal tip portion to the first diameter of the main body is between 12:1 and 250:1.

25. (Currently amended): The guidewire of claim 21, wherein the length of the flexible tip that extends beyond the elongate tip of the distal tip portion is greater than 3 mm.

26. (Currently amended): A guidewire comprising:

an elongate member comprising a proximal end and a distal end tip portion, the proximal end having a first outer diameter and an elongate tip of the distal end tip portion having a uniform second outer diameter; and

a coating disposed on the elongate tip of the distal end tip portion of the elongate member, at least a portion of the an exterior of the coating has a taper that approximates a corresponding taper of the elongate member, the coating comprising a flexible tip of substantially polymeric material and having a solid internal structure that (1) extends extending distally beyond the elongate tip of the distal end tip portion and encompassing (2) encloses a solid member, the solid member being supported solely by the flexible tip of the coating and spaced from the distal end tip portion to provide localized weight within the coating flexible tip, a length by which the flexible tip extends distally beyond the elongate tip of the distal tip portion of the elongate member being approximately equal to or greater than a longitudinal length of the elongate tip of the distal end tip portion.

27. (Original): The guidewire according to claim 26, wherein the solid member comprises a radiopaque marker.

28. (Cancelled)